

## ABSTRACT

1 Measurements are made continuously with a seismic while drilling (SWD) system and  
2 the measured data are stored in a working memory of a downhole processor along with  
3 quality control (QC) measurements. The QC data are analyzed and based on the analysis,  
4 portions of the data in working memory are recorded in permanent memory for retrieval.  
5 Alternatively, QC measurements are made substantially continuously predictions are  
6 made when data quality for SWD measurements are likely to be good. Recording of  
7 SWD data are then started based on the prediction.  
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